

Consumption Patterns

Tobacco, Alcohol and Illicit Drugs Consumption Patterns.

Patterns of alcohol and illicit drug consumption and other consequences of substance use not directly related to death or illness are discussed in this section. Consumption does not necessarily result in death or illness but some consumption patterns such as binge drinking or illicit drug use predict health consequences better than others due to the impairment following such use. Other consequences such as arrests for drug possession suggest a social cost in terms of infringement of laws and behavioral norms.

Age of Initiation.

On average, youth appear to experiment with cigarettes and their first sip of alcohol prior to their thirteenth birthday, after which they try marijuana for the first time. Shortly after their fourteenth birthday, on average youth report their first regular alcohol use and/or their first use of methamphetamine.

Finding: Youth experimentation appears to begin with cigarettes.

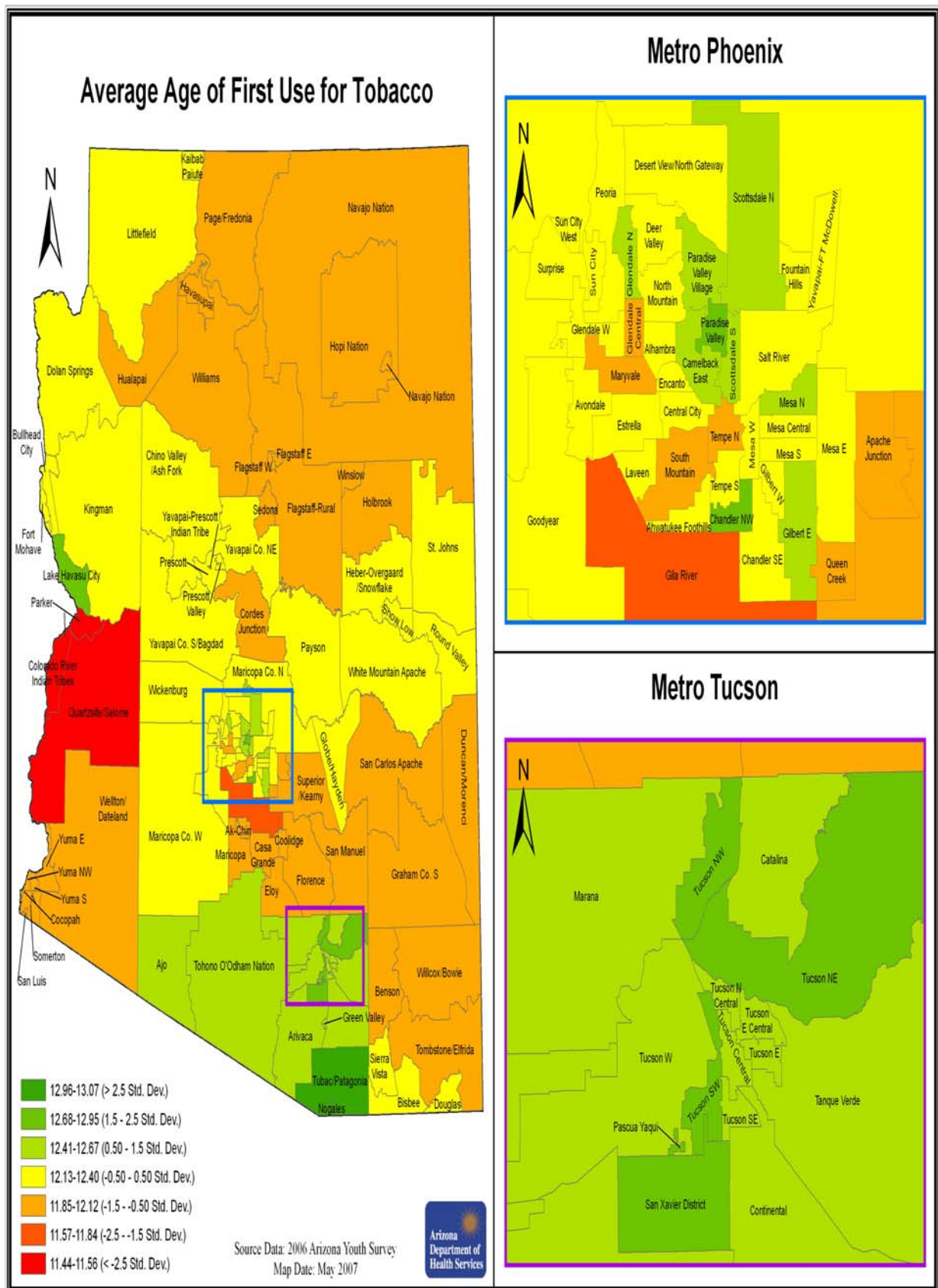
Given that we know that smoking-attributable diseases cause more deaths than illicit drug use and alcohol use combined (see Mortality, Table 4.2), this finding should cause great concern.

Table 4.19. Average Age of Initiation by Substance Used, Arizona, 2006

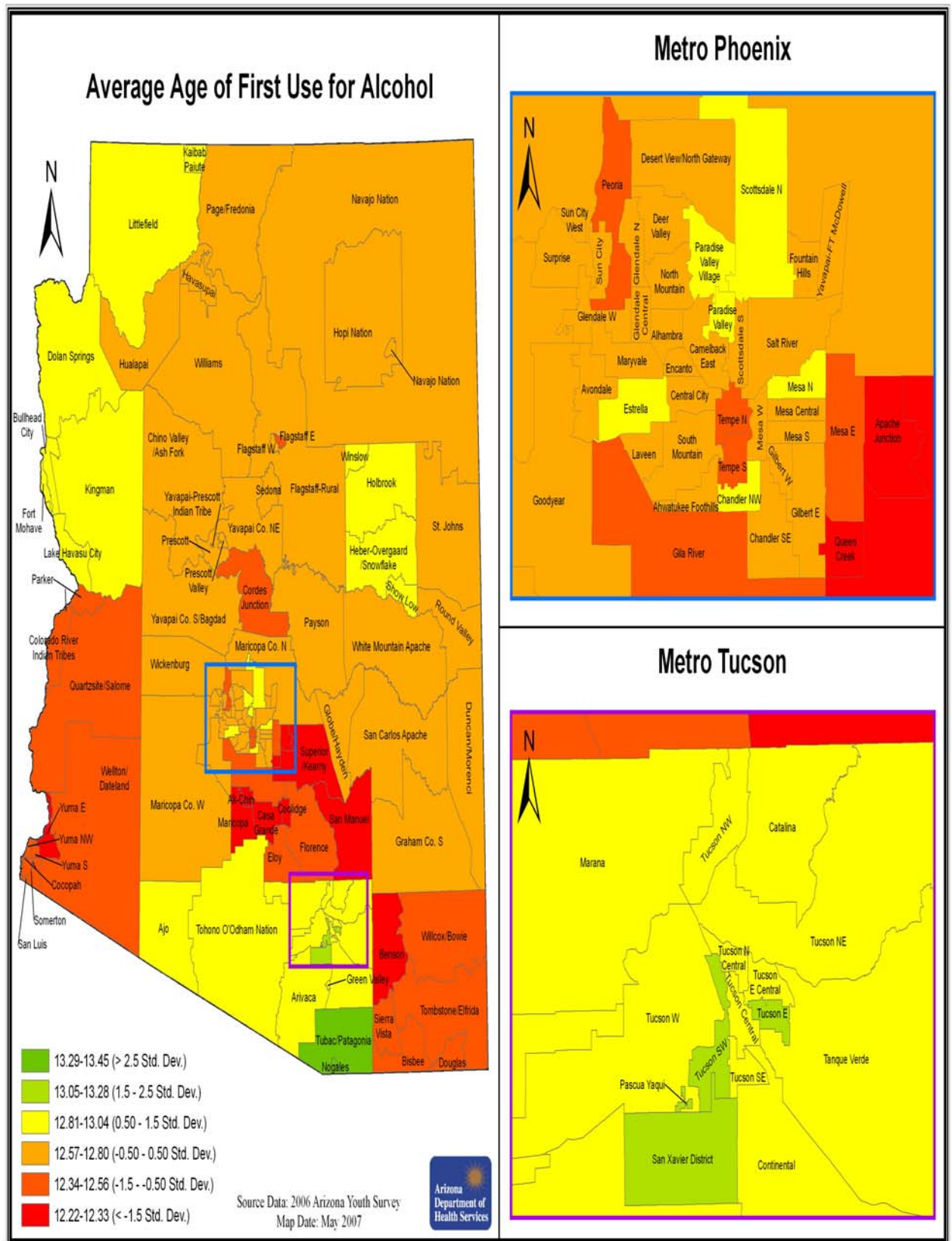
Substance	Age in Years
First Cigarette Use	12.47
First Alcohol Sip (or more)	12.84
First Marijuana Use	13.24
First Use of Methamphetamine	14.11
First Regular Alcohol Use	14.21

Source: *Arizona Youth Survey: State Report, 2006*. Arizona Criminal Justice Commission.

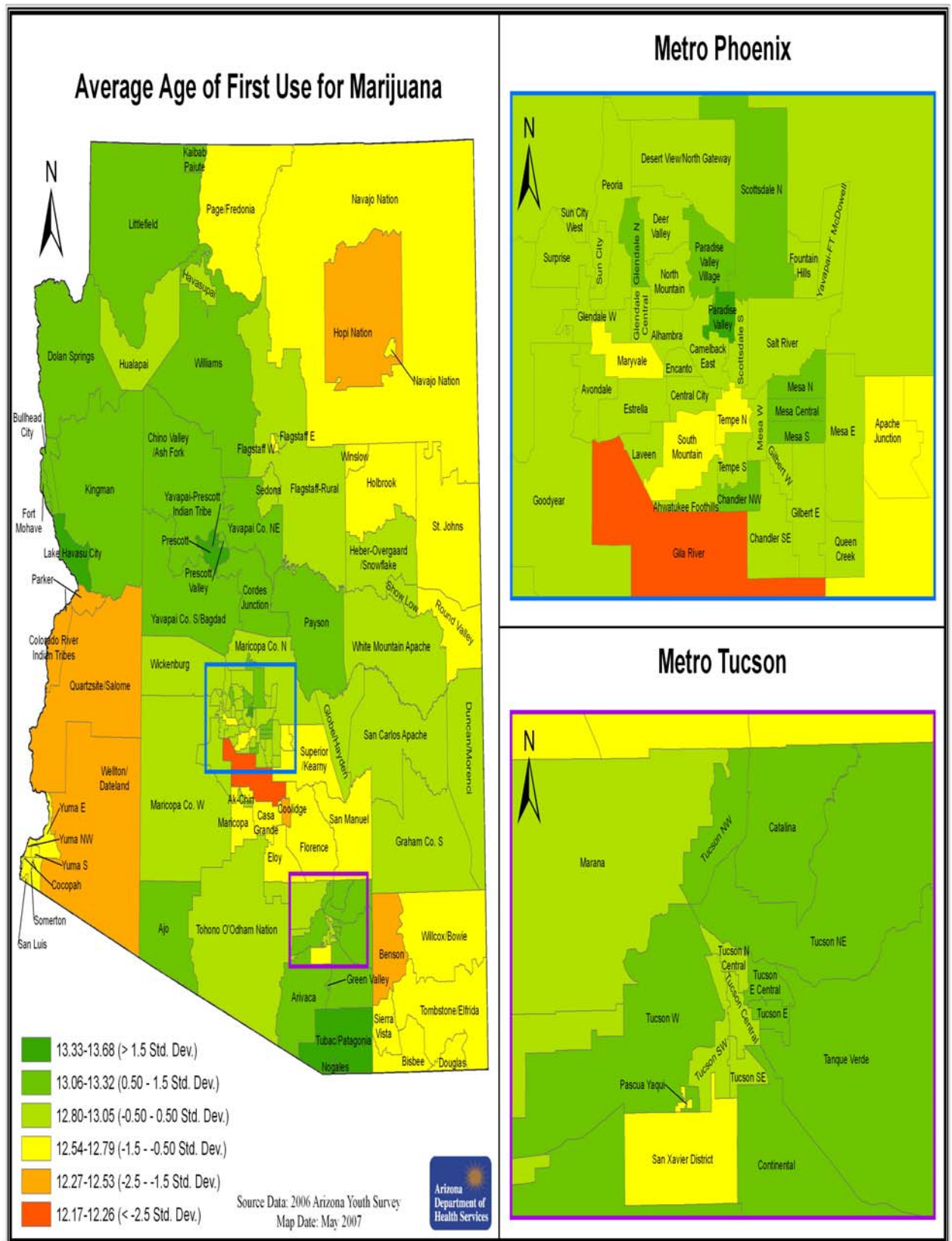
Map 4.1.



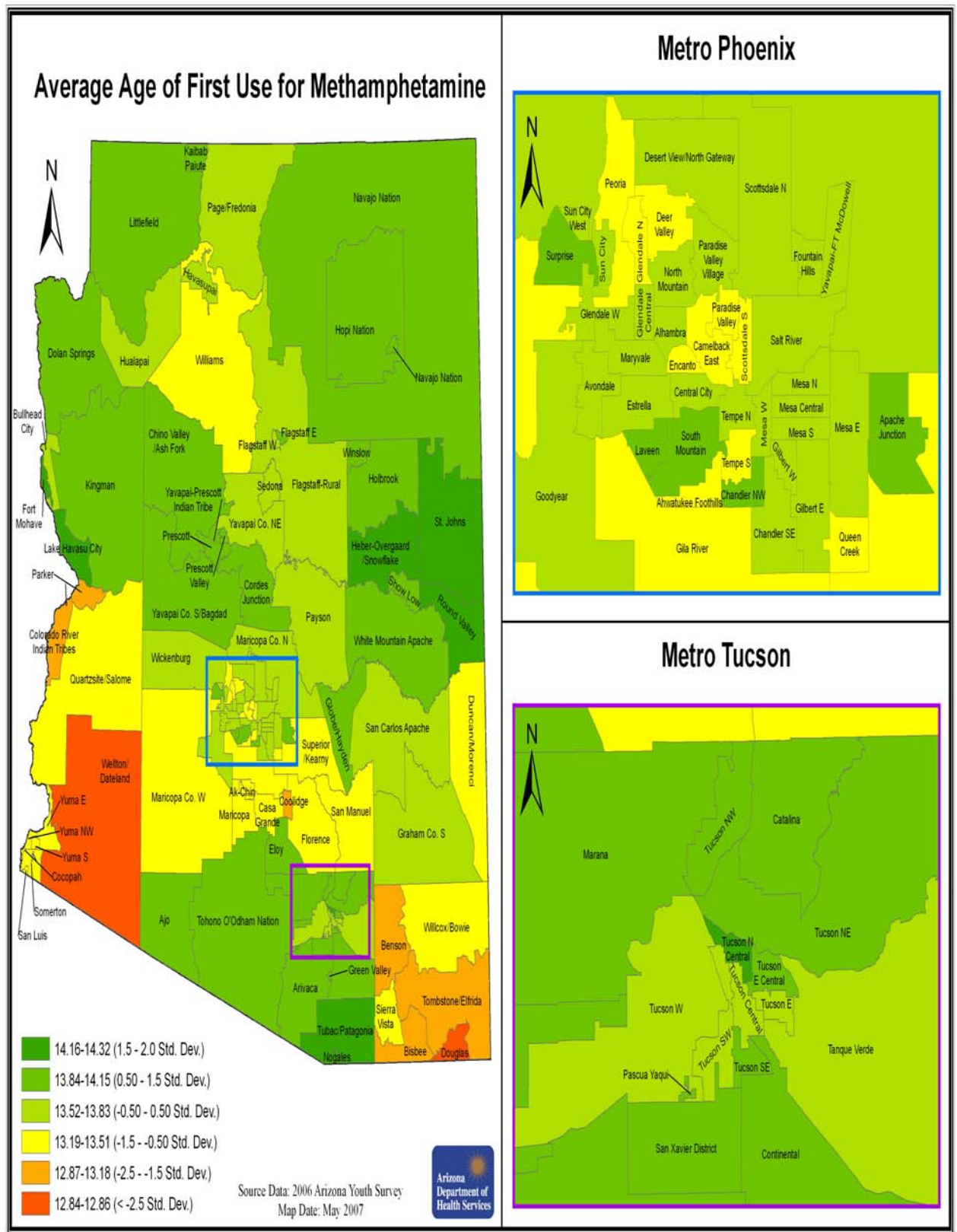
Map 4.2.



Map 4.3.



Map 4.4.



Past 30-Day Underage Alcohol Use Consumption.

Underage drinking has received significant attention at both the state and national level. The Surgeon General's *Call to Action to Prevent and Reduce Underage Drinking*, released in March 2007, emphasized how underage drinking puts our youth at greater risk for academic problems, criminal behavior, poor decision making, risky sexual activity, perpetration of physical and sexual assaults, victimization through physical and sexual assaults, damage to their developing brains, and increased likelihood of death.

"Research shows that young people who start drinking before the age of 15 are five times more likely to have alcohol-related problems later in life. New research also indicates that alcohol may harm the developing adolescent brain. The availability of this research provides more reasons than ever before for parents and other adults to protect the health and safety of our nation's children."
Acting Surgeon General Kenneth Moritsugu, M.D., M.P.H.

Alcohol psychoses is defined in the Diagnostic and Statistical Manual of Mental Disorders, 4th Edition (DSM-IV) (American Psychiatric Association [APA], 1994) as substance-induced psychotic disorders in which a person has hallucinations or delusions that are judged to be due to the direct physiological effects of alcohol.

The consequences associated with underage drinking impact our judicial system, the safety of our roadways, and the successful development of our youth. Underage drinking also imposes an extraordinary financial burden on society at large. In 2005, underage drinking cost the state approximately \$1.3 billion dollars. Table 4.19 provides an illustration of the costs of underage drinking, broken down by problem area. If underage drinkers who become violent and/or drink and drive continue these behaviors into adulthood, Arizona will pay long into the future.

Finding: The top three problem categories for underage drinking—youth violence, youth traffic crashes and high-risk sex related to alcohol use—cost the state over \$1 billion dollars.

Table 4.20. Costs of Underage Drinking by Problem Area, Arizona, 2005

Problem	Total Costs
Youth Violence	\$508,500,000
Youth Traffic Crashes	\$398,700,000
High-Risk Sex, Aged 14 – 20	\$182,400,000
Youth Property Crime	\$96,700,000
Youth Injury	\$34,800,000
Poisonings and Psychoses*	\$10,200,000
Fetal Alcohol Syndrome among Mothers Aged 15 – 20	\$33,400,000
Youth Alcohol Treatment	\$31,600,000
Total	\$1,296,400,000

*Alcohol psychoses is defined in the *Diagnostic and Statistical Manual of Mental Disorders*, 4th Edition (DSM-IV) (American Psychiatric Association [APA], 1994).

Note. Total is greater than the sum of the total costs due to rounding. Data is garnered from a report, which does not allow for more accurate tabulation of the total costs.

Source: *Underage Drinking in Arizona: The Facts*. Available online at:
<http://www.udetc.org/factsheets/Arizona.pdf>

Finding: Almost half of Arizona's high school seniors reported current alcohol consumption.

Table 4.21. Current Substance Use, Percentages, Arizona, 2005

Youth Use	%
Tobacco Use	
Middle school students who reported current cigarette use ¹	8.00
Middle school students who reported current smokeless tobacco use ¹	2.00
High school students who reported current cigarette use ¹	20.00
High school students who reported current smokeless tobacco use ¹	4.00
High school students who reported current cigarette use ^{2*}	21.40
Alcohol Use	
High school students who reported current alcohol consumption ^{2*}	47.10
Marijuana Use	
High school students who reported current marijuana consumption ^{2*}	20.00
Cocaine Use	
High school students who reported current cocaine consumption ^{2*}	6.10
Adult Use	
Adults who report current cigarette use ³	20.20

On at least 1 day in the 30 days preceding the survey.

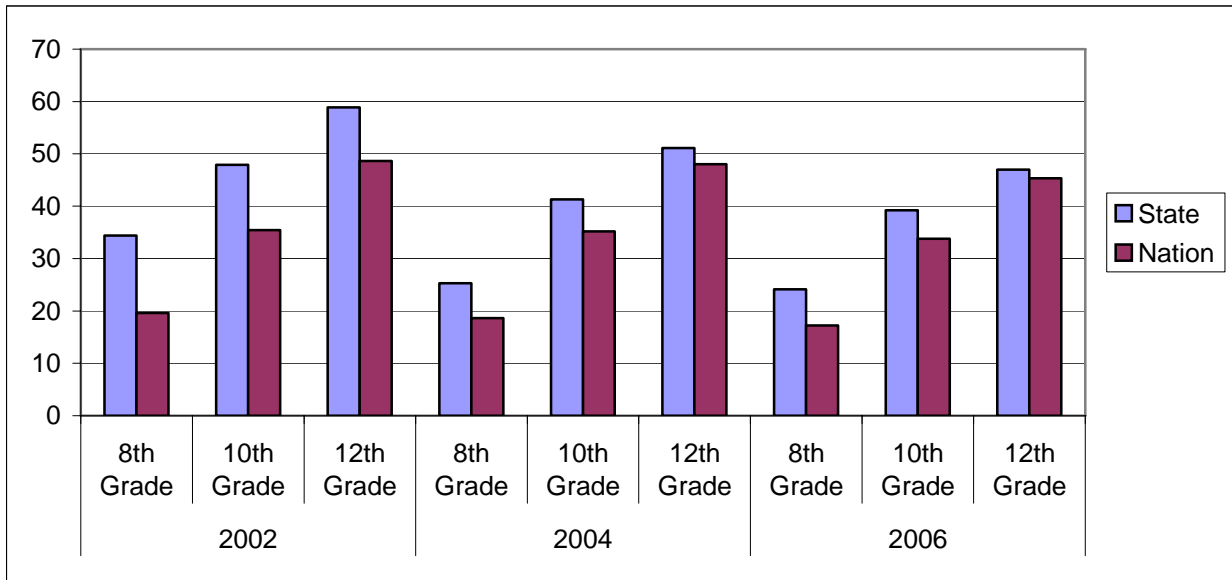
¹ *Arizona Youth Tobacco Survey: 2005 Report*. Arizona Department of Health Services.

² *Youth Risk Behavior Surveillance System, 2005*. Centers for Disease Control and Prevention.

³ *2005 Behavioral Risk Factors of Arizona Adults*. Arizona Department of Health Services.

Figure 4.11 is a graphic representation of how Arizona compares to the nation on past 30-day youth alcohol use from 2002 to 2006. The data show that alcohol use increases with age. More Arizona youth report past 30-day alcohol use than the national average, but a reduction in consumption over the years examined is noted.

Figure 4.11. Comparison of Percentage of Arizona Youth to National Youth Reporting Past 30-day Alcohol Use.



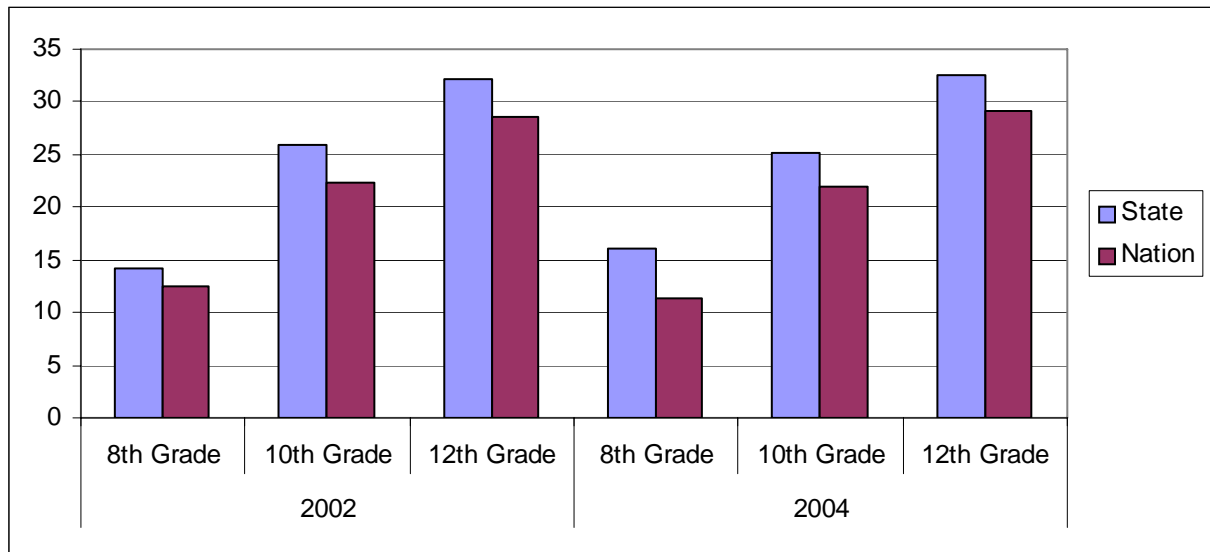
Arizona Data Source: *Arizona Youth Survey: State Report, 2006*. Arizona Criminal Justice Commission.

National Data Source: *Monitoring the Future, 2006*.

While there are serious harms associated with any alcohol use by youth, the consequences associated with underage drinking are exacerbated when youth drink heavily. Binge drinking, defined as the consumption of five or more drinks in one sitting, often leads to impairment that can cause injury. Binge drinking may also be a better marker for alcohol abuse or dependence in youth or later in adulthood than general alcohol use.

Figure 4.12 shows the percentage of students who reported binge drinking, both in Arizona and nationwide, and indicates that in both 2002 and 2004, more Arizona youth in 8th, 10th and 12th grades reported binge drinking than did youth nationally, which may, in part, help explain the high costs of underage drinking in Arizona.

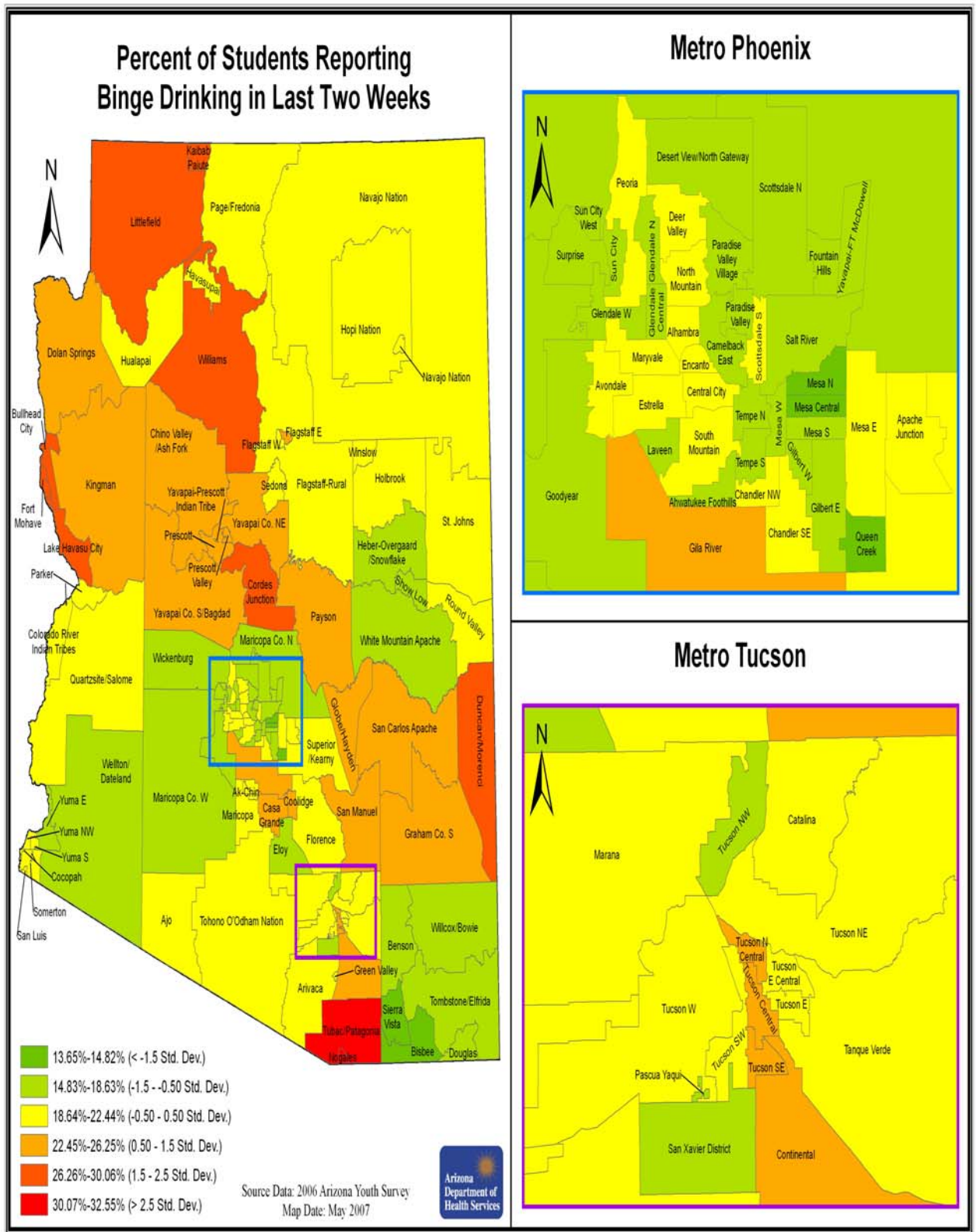
Figure 4.12. Comparison of Percentage of Arizona Youth to National Youth (8th, 10th, and 12th Grade Students) Who Reported Past 2-Week Binge Drinking, 2002 – 2004.



Arizona Data Source: *Arizona Youth Survey: State Report, 2006*. Arizona Criminal Justice Commission.

National Data Source: *Monitoring the Future, 2006*.

Map 4.5.



Percent of Youth Who Used Alcohol in Last 30 Days (8, 10, 12 grades)

Legend:

- 26.37%-28.26% (< -1.5 Std. Dev.)
- 28.27%-33.01% (-1.5 - -0.50 Std. Dev.)
- 33.02%-37.77% (-0.50 - 0.50 Std. Dev.)
- 37.78%-42.52% (0.50 - 1.5 Std. Dev.)
- 42.53%-47.28% (1.5 - 2.5 Std. Dev.)
- 47.29%-48.47% (> 2.5 Std. Dev.)

Source Data: 2006 Arizona Youth Survey
Map Date: May 2007

Arizona Department of Health Services

Metro Phoenix

Legend:

- 26.37%-28.26% (< -1.5 Std. Dev.)
- 28.27%-33.01% (-1.5 - -0.50 Std. Dev.)
- 33.02%-37.77% (-0.50 - 0.50 Std. Dev.)
- 37.78%-42.52% (0.50 - 1.5 Std. Dev.)
- 42.53%-47.28% (1.5 - 2.5 Std. Dev.)
- 47.29%-48.47% (> 2.5 Std. Dev.)

Metro Tucson

Legend:

- 26.37%-28.26% (< -1.5 Std. Dev.)
- 28.27%-33.01% (-1.5 - -0.50 Std. Dev.)
- 33.02%-37.77% (-0.50 - 0.50 Std. Dev.)
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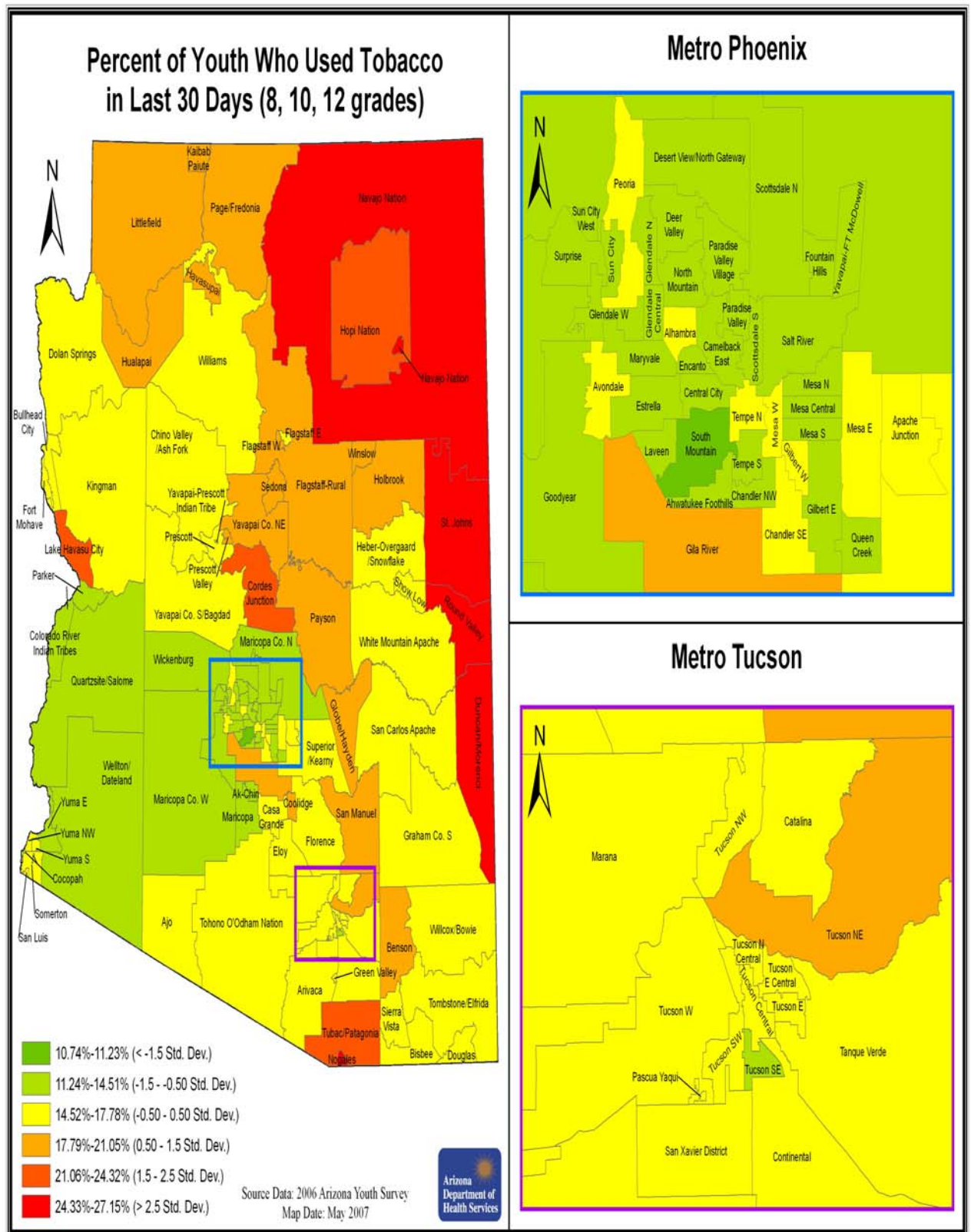
Adult Alcohol Use Consumption.

Finding: Well over half of Arizona adult respondents reported past 30-day alcohol use. More surprising is the finding that almost 1 in 4 adults reported past 30-day binge drinking.

Tobacco Consumption.***Underage Tobacco Use.***

There is a marked increase in the percentage of students who reported current cigarette smoking in middle school and those who reported such use in high school. Specifically, while less than 1 in 10 middle school students reported smoking cigarettes, this number increased to 1 in 5 in high school. The use of smokeless tobacco products also increased during the transition from middle school to high school.

Map 4.7.



Adult Tobacco Use.

Table 4.22 presents alcohol and drug use data for Arizona from the *National Survey on Drug Use and Health*, the Arizona Youth Survey, and the Arizona Adult Tobacco Survey on a variety of substances. Alcohol, cigarette, and illicit drug use estimates are provided for individuals aged 12 and older, and alcohol use estimates are provided for individuals from 12 to 20 years old and those 12 years and older. While responsible alcohol consumption for adults may not be a problem, binge drinking, defined as five or more drinks in one sitting, often leads to impairment that can lead to injury or may be a marker for alcohol abuse or dependence. Because alcohol use is illegal for those individuals under the age of 21, both alcohol use and binge alcohol use present a potential problem for this age group.

Finding: 1 in 5 high school students reported current cigarette use.

Finding: Of youth surveyed, past 30-day tobacco use is reported to be highest among 12th graders.

Finding: Over one-quarter (or 1 in 4) underage respondents (aged 12 – 20) reported past 30-day alcohol use.

Finding: 1 in 5 adults reported current cigarette use.

Table 4.22. Past 30-day Tobacco & Alcohol Use, Percentages, Arizona

Youth Use	%
Tobacco Use	
8 th grade students who report past 30-day cigarette use ¹	10.50
8 th grade students who report past 30-day smokeless tobacco use ¹	2.70
10 th grade students who report past 30-day cigarette use ¹	17.10
10 th grade students who report past 30-day smokeless tobacco use ¹	4.00
12 th grade students who report past 30-day cigarette use ¹	21.80
12 th grade students who report past 30-day smokeless tobacco use ¹	5.40
Alcohol Use	
Alcohol use ^{2*}	27.15
Binge alcohol use ^{2*+}	18.59
Adult Use	
Tobacco Use	
Adults 18 and older who report current cigarette use ³	19.00
Adults 18 and older who report smokeless tobacco use ³	2.00
Alcohol Use	
Alcohol use ^{2**}	55.43
Binge alcohol use ^{2**+}	24.11

* Aged 12 – 20

** Aged 12 and over

+ Binge alcohol use is defined as consuming 5 or more alcoholic drinks on the same occasion on at least 1 day within the last 30 days.

Note. Current cigarette use is defined as having smoked 100 cigarettes or more in one's lifetime and currently being a smoker.

¹ *Arizona Youth Survey: State Report, 2006.* Arizona Criminal Justice Commission.

² *State Estimates of Substance Use from the 2004 – 2005 National Surveys on Drug Use and Health.* Substance Abuse and Mental Health Services Administration, Department of Health and Human Services.

³ *Arizona Adult Tobacco Survey: 2005 Report.* Arizona Department of Health Services.

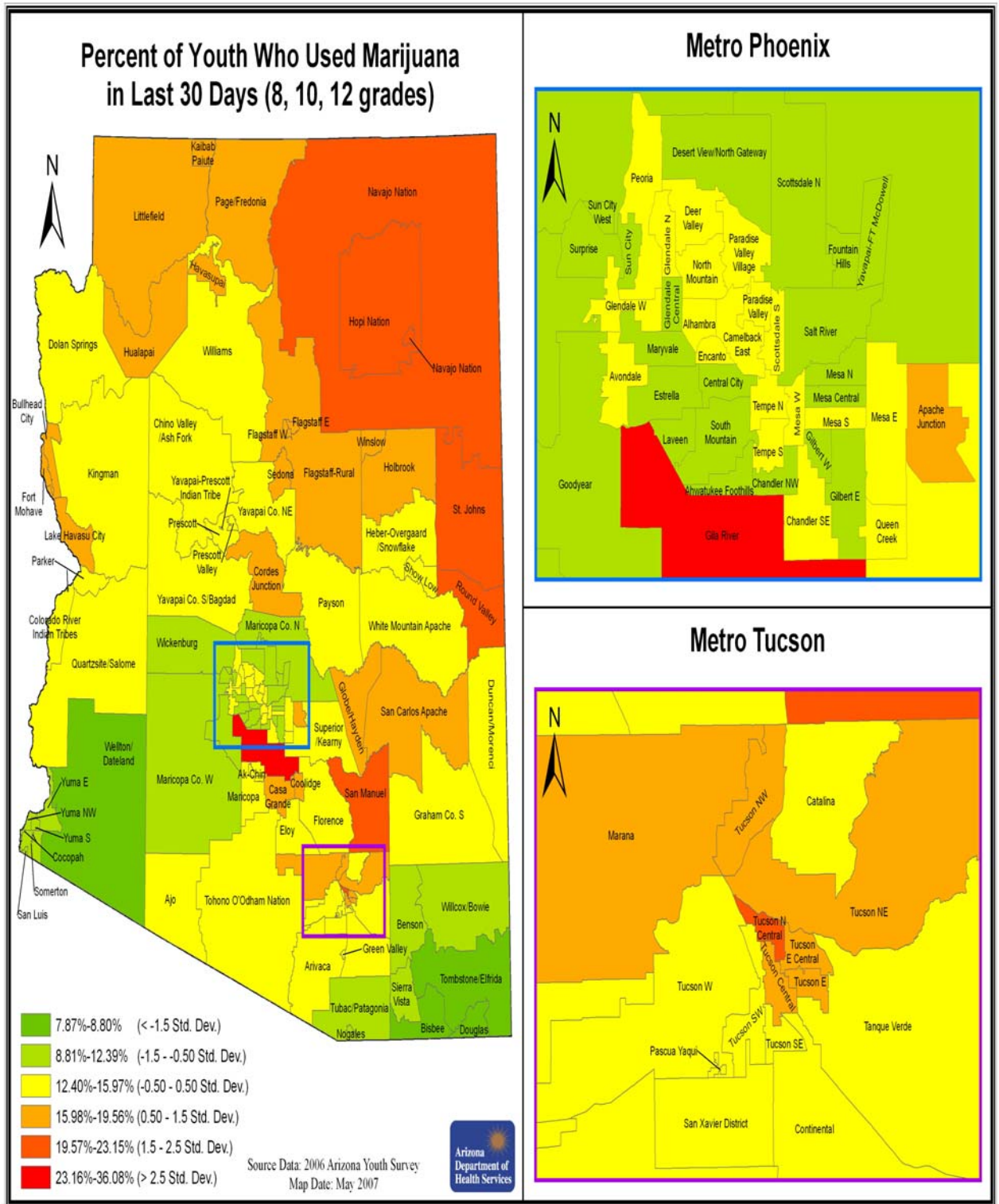
Illicit Drug Consumption.

For most substances, a higher percentage of 12th graders reported past 30-day use than 8th or 10th graders. However, the same percentage of 10th and 12th grade students (i.e., 1.70%) reported the use of hallucinogens in the past 30 days. In addition, equal percentages of 10th and 12th grade students (i.e., 1.00%) admitted to using steroids in the past 30 days.

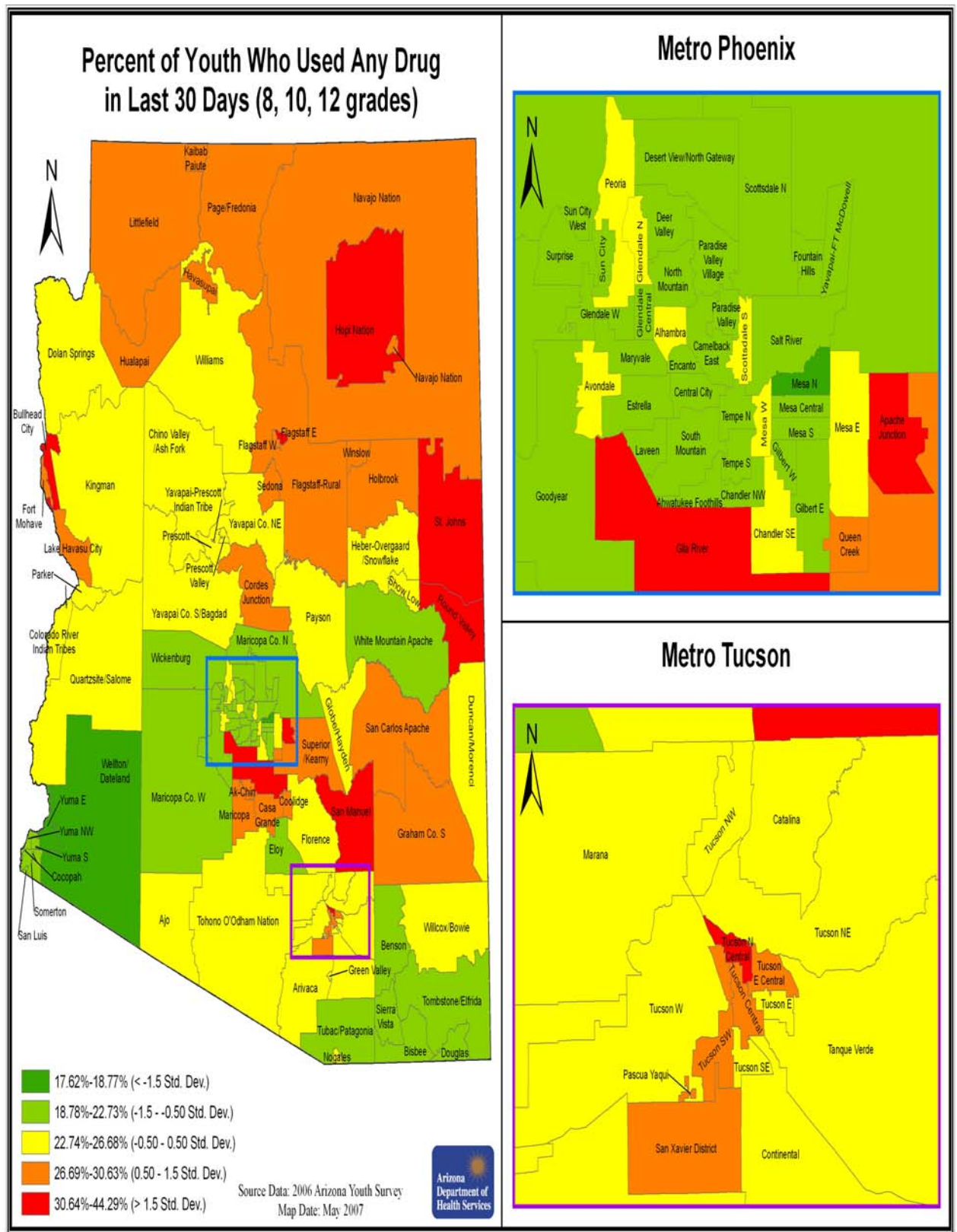
10th grade appears to be an especially problematic time in teenagers' lives as a slightly higher percentage (2.90% of 10th graders vs. 2.60% of 12th graders) of them reported the use of stimulants, Ecstasy and methamphetamine use in the past 30 days.

Overall, the substances most often reported used in the past 30 days, regardless of grade, were alcohol, cigarettes and marijuana, as over 1 in 10 youth admitted to using marijuana or cigarettes in the past 30 days and over one-third of youth reported alcohol use during the same time period. Multiple drug use also appears to be a problem area for youth, especially among 12th graders; almost 10% of youth reported using all three of the most prevalently used substances (i.e., alcohol, cigarettes and marijuana). Over 15% of 12th graders reported using both alcohol and marijuana and almost 20% of them admitted to the combined use of tobacco and alcohol.

Map 4.8.



Map 4.9.



Finding: 8th graders were twice as likely as 10th graders, and almost four times as likely as 12th graders to report the use of inhalants in the past 30 days.

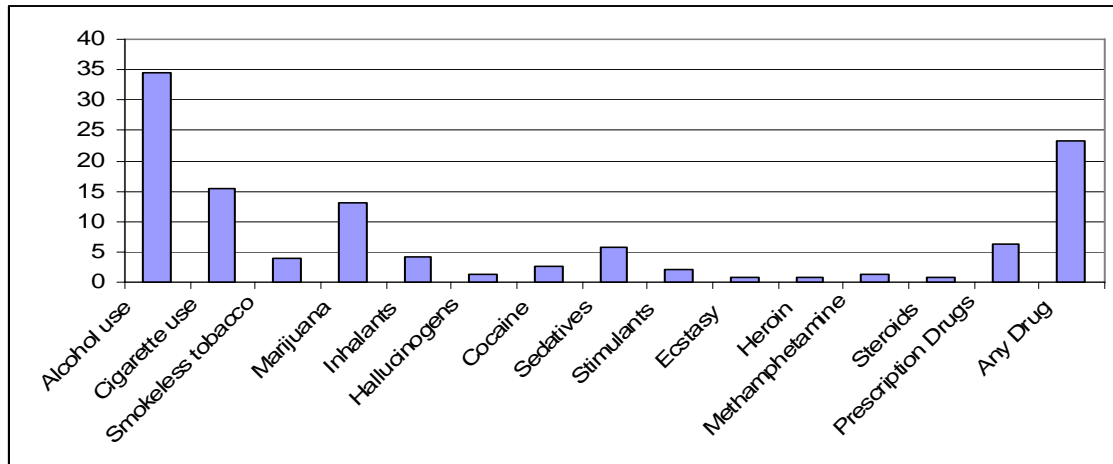
Table 4.23. Percentage of Students Reporting Past 30-Day Substance Use by Substance and Grade, Arizona, 2006

	Grade 8	Grade 10	Grade 12	Total
Alcohol use	24.10	39.20	47.00	34.40
Cigarette use	10.50	17.10	21.80	15.30
Smokeless tobacco	2.70	4.00	5.40	3.80
Marijuana	8.50	15.70	18.10	13.10
Inhalants	6.20	3.10	1.70	4.10
Hallucinogens	1.00	1.70	1.70	1.40
Cocaine	1.70	2.90	3.40	2.50
Sedatives	4.50	6.60	7.10	5.80
Stimulants	1.50	2.90	2.60	2.20
Ecstasy	0.80	1.00	0.90	0.90
Heroin	0.70	0.70	0.80	0.70
Methamphetamine	1.00	1.70	1.40	1.30
Steroids	0.80	1.00	1.00	0.90
Prescription Drugs	4.50	7.30	8.10	6.30
Any Drug	19.70	25.60	26.60	23.30

Note. Percentages in bold indicate the grade reporting the highest percentage of past 30-day substance use.

Source: *Arizona Youth Survey: State Report, 2006*. Arizona Criminal Justice Commission.

Figure 4.13. Percentage of Students Reporting Past 30-day Substance Use by Substance, Arizona, 2006.



Note. 8th, 10th, and 12th grade students combined.

Source: *Arizona Youth Survey: State Report, 2006*. Arizona Criminal Justice Commission.

Finding: The same percentage of youth who report current cigarette use (i.e., 20% or 1 in 5) self-report current marijuana consumption.

Table 4.24. Percentage of Students Reporting Past 30-day Use of Alcohol, Marijuana or Cocaine, Arizona, 2005

Substance	%
Alcohol	47.10
Marijuana	20.00
Cocaine, any form	6.10

Source: *Youth Risk Behavior Surveillance System, 2005*. Centers for Disease Control and Prevention.

Table 4.25. Percentage of Students Reporting Past 30-Day Multiple Drug Use by Grade and Substance, Arizona, 2006

	Grade 8	Grade 10	Grade 12	Total
Tobacco & alcohol	7.70	14.40	19.40	12.60
Tobacco & marijuana	4.40	8.50	10.50	7.20
Alcohol & marijuana	6.40	12.80	15.60	10.60
Marijuana & tobacco & alcohol (all three)	3.70	7.50	9.60	6.30
Alcohol & any other drug	10.50	17.60	20.10	15.10
Tobacco & any other drug	6.60	10.90	13.30	9.60

Note. Percentages in bold indicate the grade reporting the highest percentage of past 30-day multiple substance use.

Source: *Arizona Youth Survey: State Report, 2006*. Arizona Criminal Justice Commission.

Methamphetamine.

Methamphetamine use and its consequences have been widely discussed by law enforcement agencies, the media, community and civic groups, and numerous prevention and treatment agencies. Further, methamphetamine is a significant threat to the health and safety of all citizens of Arizona. The production, distribution, and use of methamphetamine is of special concern because of the pervasiveness of the problem in Arizona and our proximity to the Mexican border, a principal port of entry for drug smuggling. In fact, while Arizona represents only 13% of the southwest U.S.-Mexico border, an estimated 40% of all drugs are seized in Arizona. According to the Drug Enforcement Administration (DEA), Mexican-produced methamphetamine is the most common type of methamphetamine encountered in Arizona (<http://www.usdoj.gov/dea/pubs/states/arizona.html>). For these reasons, the Substance Abuse Epidemiology Work Group analyzed this drug's consumption and consequence patterns separately.

The *Arizona Youth Survey* provides a measure of methamphetamine use for 8th, 10th, and 12th grade students in Arizona. Table 4.26 presents the percentages of 8th, 10th, and 12th grade students that are estimated to have used methamphetamine in the past 30 days and Table 4.28 presents the percentages of students in these grades that have used methamphetamine in their lifetime.

In 2006, 1.30 percent of 8th, 10th and 12th grade students were estimated to have used methamphetamine in the past 30 days, with a higher percentage of 10th graders reporting such use.

Table 4.26. Percentage of Past 30-Day Methamphetamine Use by Grade, 2006

Grade	%
8 th Grade	1.00
10 th Grade	1.70
12 th Grade	1.40
Total	1.30

Source: *Arizona Youth Survey: State Report, 2006*. Arizona Criminal Justice Commission.

Table 4.27 compares Arizona 8th, 10th, and 12th graders to youth across the nation and indicates that Arizona youth are more likely to use methamphetamine during the 30-day period preceding the survey than are youth across the nation. Tenth grade appears to be an especially high-risk time for Arizona students as a higher percentage of them reported using methamphetamine than did 8th and 12th graders.

Table 4.27. Comparison of Percentage of Arizona and National 8th, 10th, and 12th Grade Youth Who Reported Past 30-Day Use of Methamphetamine, 2006

	Arizona	United States
Grade 8	1.00	0.60
Grade 10	1.70	0.70
Grade 12	1.40	0.90

Arizona Data Source: *Arizona Youth Survey: State Report, 2006*. Arizona Criminal Justice Commission.

National Data Source: *Monitoring the Future, 2006*.

Lifetime Use.***Lifetime Alcohol Use.******Lifetime Underage Alcohol Use.***

The *Arizona Youth Survey* reveals alarming underage alcohol use. Almost three out of every four 12th graders reported having used alcohol during their lifetime. In addition, two out of every three 10th graders and half of 8th graders also reported lifetime alcohol use.

Lifetime Adult Alcohol Use.

Data on adult lifetime use of alcohol were not available to inform this report.

Lifetime Tobacco Use.***Lifetime Underage Tobacco Use.***

The *Arizona Youth Survey* reveals that half of all 12th graders reported smoking cigarettes in their lifetime. Further, high percentages of tobacco use are not limited to cigarette smoking as a higher percentage of students reported smokeless tobacco use than reported the use of hallucinogens, cocaine, stimulants, Ecstasy, and heroin.

Lifetime Adult Tobacco Use.

According to the *Arizona Adult Tobacco Survey Report* for 2005 from the Arizona Department of Health's Office of Tobacco Education and Prevention Program, 55% of respondents reported that they had never smoked (or smoked less than 100 cigarettes in one's lifetime); 19% reported that they are current smokers; and the remaining 26% reported that they are former smokers.

Lifetime Illicit Drug Consumption.

According to the *Arizona Youth Survey*, a higher percentage of 12th grade students reported lifetime substance use than did 8th or 10th grade students; however, a higher percentage of 8th grade students reported inhalant use than did those in 10th or 12th grades. Further, the *Youth Risk Behavior Surveillance System* indicates that a higher percentage of youth reported marijuana use than did those who reported the use of cocaine, methamphetamine, Ecstasy, steroids, or heroin.

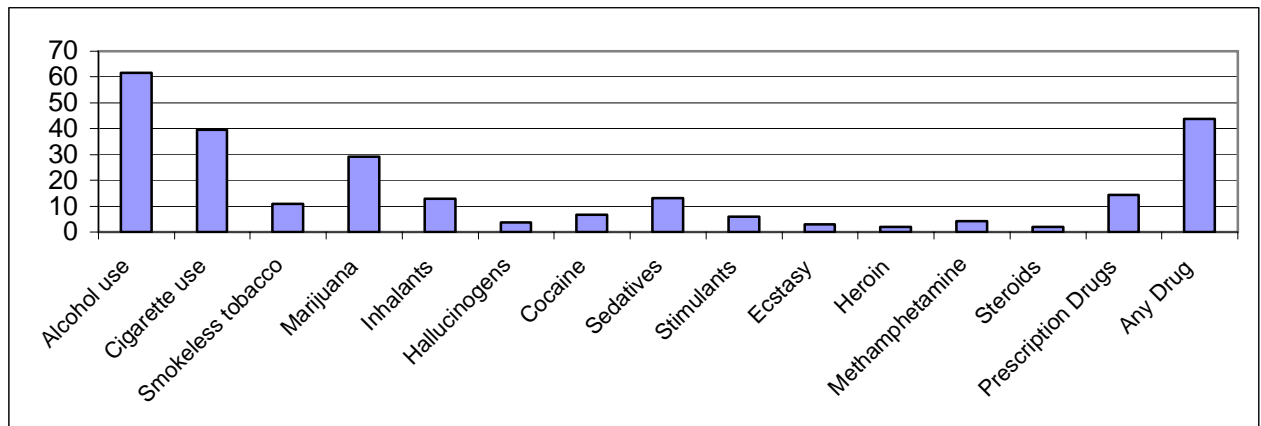
Table 4.28. Percentage of Students Reporting Lifetime Substance Use by Substance and Grade, Arizona, 2006

	Grade 8	Grade 10	Grade 12	Total
Alcohol use	50.40	67.60	74.50	61.70
Cigarette use	30.80	43.80	50.00	39.60
Smokeless tobacco	8.00	11.80	15.60	11.00
Marijuana	18.30	34.00	42.60	29.20
Inhalants	15.20	11.90	9.80	12.90
Hallucinogens	2.10	4.10	5.60	3.60
Cocaine	3.60	7.60	11.60	6.80
Sedatives	10.00	14.30	17.40	13.20
Stimulants	3.40	7.10	8.50	5.90
Ecstasy	1.90	3.40	4.40	3.00
Heroin	1.40	2.10	2.80	2.00
Methamphetamine	2.60	5.00	6.60	4.30
Steroids	1.60	2.00	2.20	1.90
Prescription Drugs	9.80	16.00	20.00	14.30
Any Drug	36.20	47.60	52.30	43.80

Note. Percentages in bold indicate the grade reporting the highest percentage of lifetime substance use.

Source: *Arizona Youth Survey: State Report, 2006*. Arizona Criminal Justice Commission.

Figure 4.14. Percentage of Students Reporting Lifetime Substance Use by Substance, Arizona, 2006.



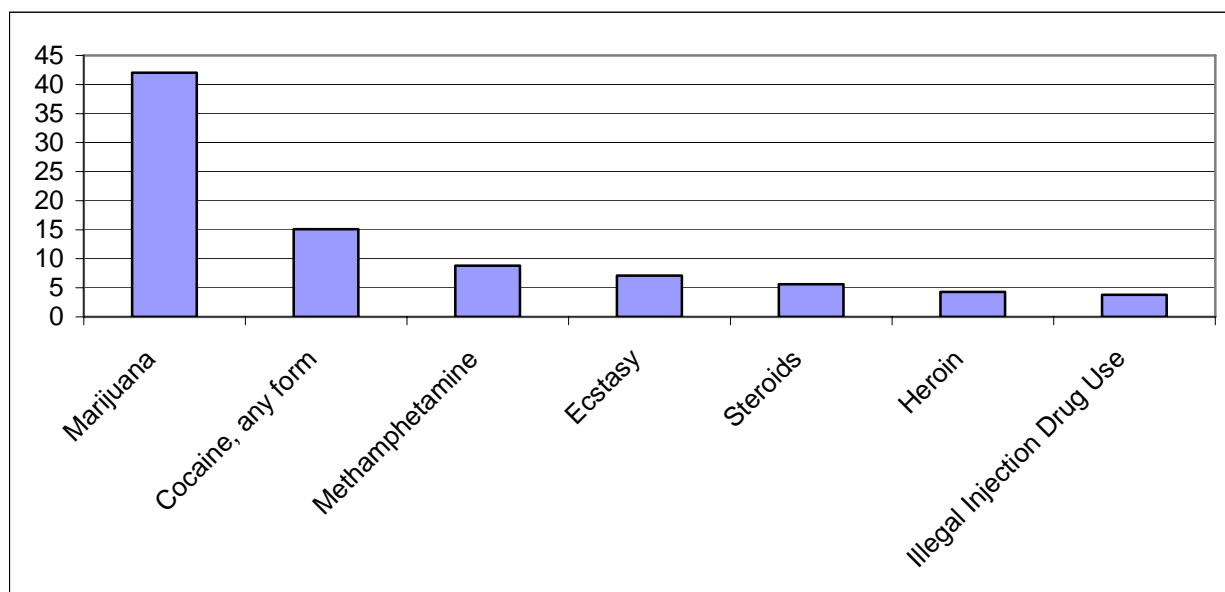
Note. 8th, 10th, and 12th grade students combined.

Source: *Arizona Youth Survey: State Report, 2006*. Arizona Criminal Justice Commission.

Table 4.29. Percentage of Students Reporting Lifetime Substance Use, Arizona, 2005

Substance	%
Marijuana	42.00
Cocaine, any form	15.10
Methamphetamine	8.80
Ecstasy	7.10
Steroids	5.60
Heroin	4.30
Illegal Injection Drug Use	3.80

Source: *Youth Risk Behavior Surveillance System, 2005*. Centers for Disease Control and Prevention.

Figure 4.15. Percentage of Students Reporting Lifetime Substance Use, Arizona, 2005

Source: *Youth Risk Behavior Surveillance System, 2005*. Centers for Disease Control and Prevention.

Lifetime Methamphetamine Use.

Recall that the *Arizona Youth Survey* provides a measure of methamphetamine use for 8th, 10th, and 12th grade students in Arizona. Table 4.30 presents the percentages of 8th, 10th, and 12th grade students that are estimated to have used methamphetamine in their lifetime. In 2006, 4.30% of students in these grades were estimated to have used methamphetamine in their lifetime.

Other data that can be used to measure methamphetamine use come from the *Youth Risk Behavior Survey*, a study conducted with a representative, school-based sample of Arizona 9th through 12th grade students. According to this survey, in 2005, 8.80% of Arizona high school students reported using methamphetamine in their lifetime, which is considerably lower than the percentage of students reporting lifetime alcohol, marijuana and cocaine use but higher than the percentage of 8th, 10th and 12th grade students who reported lifetime methamphetamine use on the *Arizona Youth Survey*.

Table 4.30. Percentage of Lifetime Methamphetamine Use by Grade, 2006

Grade	%
8 th Grade ¹	2.60
10 th Grade ¹	5.00
12 th Grade ¹	6.60
Total¹	4.30
 High School Students ²	 8.80

¹ *Arizona Youth Survey: State Report, 2006.* Arizona Criminal Justice Commission.

² *Youth Risk Behavior Surveillance System, 2005.* Centers for Disease Control and Prevention.

Trends in Consumption.

Trends in Alcohol Consumption.

The average age of first use and regular use of alcohol has declined slightly since 2002. Further, the percentage of high school students reporting current alcohol use has also declined since that time. Most notably, there was a 20% decrease in the percentage of 12th graders reporting current alcohol use. However, almost half of all 12th graders still reported such use in 2005 (down from almost 59% in 2002).

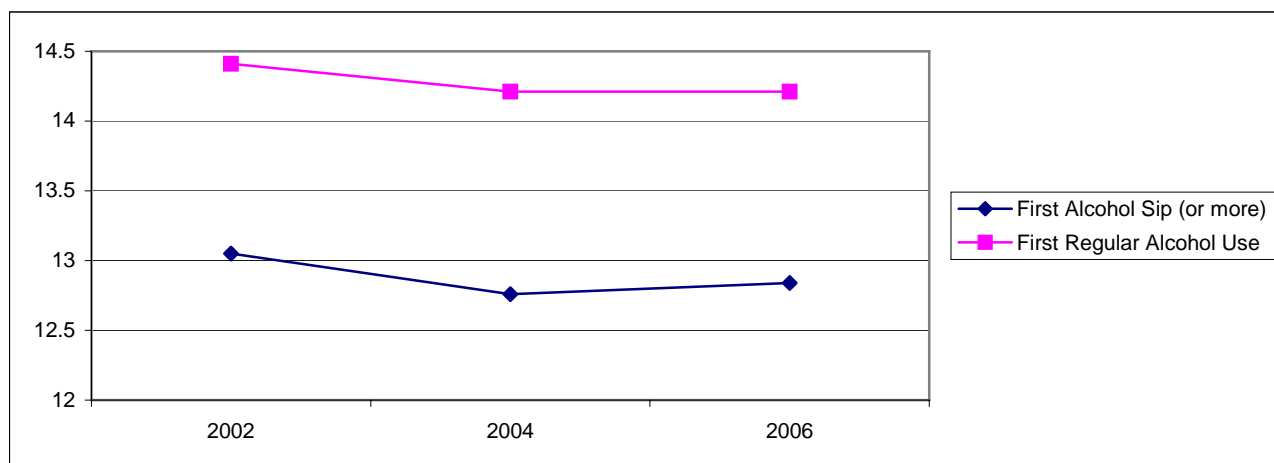
While federal estimates show a slight decline in binge drinking between 2002 and 2005, a higher percentage of adults (aged 12 and older) are estimated to have used alcohol in 2005 than in 2002.

Table 4.31. Trends in Average Age of Initiation by Type of Alcohol Use, Arizona, 2002 – 2006

	2002	2004	2006
First Alcohol Sip (or more)	13.05	12.76	12.84
First Regular Alcohol Use	14.41	14.21	14.21

Source: *Arizona Youth Survey: State Report, 2006*. Arizona Criminal Justice Commission.

Figure 4.16. Trends in Average Age of Initiation by Type of Alcohol Use, Arizona, 2002 – 2006.



Source: *Arizona Youth Survey: State Report, 2006*. Arizona Criminal Justice Commission.

Table 4.32. Trends in Percentage of High School Students Reporting Current Alcohol Use, Arizona, 2002 – 2006

	2002	2003	2004	2005	2006
High school students who reported current alcohol consumption ^{1*}	--	50.90	--	47.10	--
Alcohol use among 10 th graders ^{2**}	47.90	--	41.30	--	39.20
Alcohol use among 12 th graders ^{2**}	58.90	--	51.10	--	47.00

-- indicates data that were not available for this report or were not collected in that year.

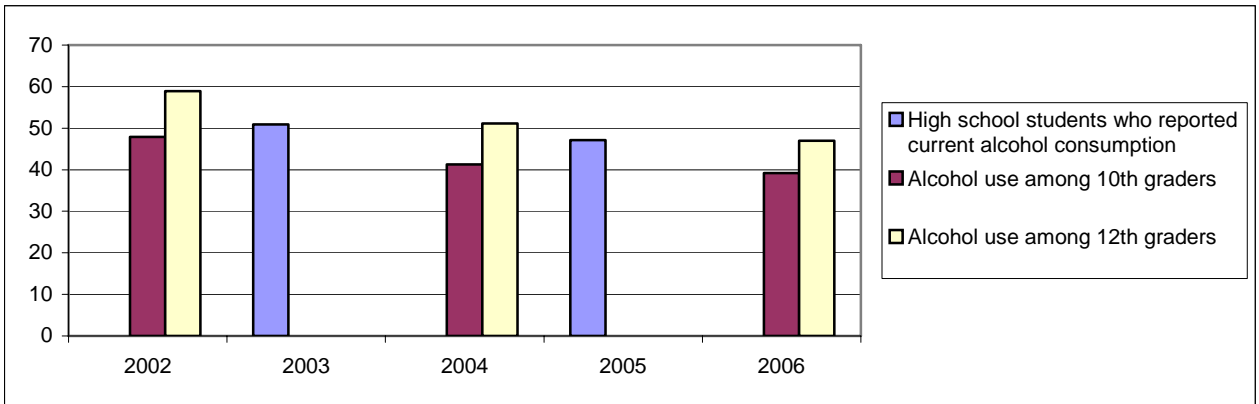
* On at least 1 day in the 30 days preceding the survey.

** Past 30-day alcohol use

¹ *Youth Risk Behavior Surveillance System, 2003; 2005.* Centers for Disease Control and Prevention.

² *Arizona Youth Survey: State Report, 2002; 2004; 2006.* Arizona Criminal Justice Commission.

Figure 4.17. Trends in Percentage of High School Students Reporting Current Alcohol Use, Arizona, 2002 – 2006



2003 and 2005 Data Source: *Youth Risk Behavior Surveillance System, 2003; 2005.* Centers for Disease Control and Prevention. These data are indicative of past 30-day alcohol use.

2002, 2004 and 2006 Data Source: *Arizona Youth Survey: State Report, 2002; 2004; 2006.* Arizona Criminal Justice Commission. These data are indicative of alcohol use on at least 1 day in the 30 days preceding the survey.

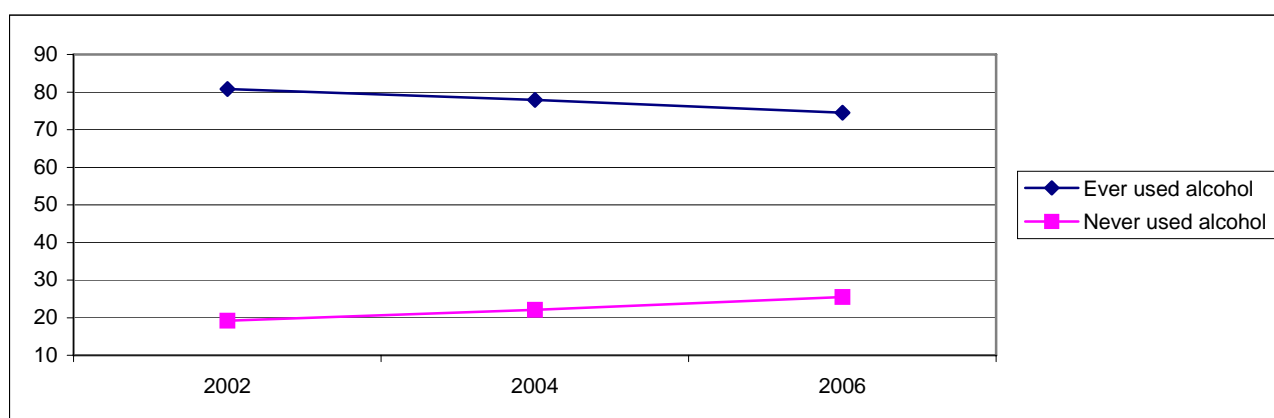
Table 4.33. Trends in Percentage of High School Seniors Reporting Lifetime Alcohol Use by Grade, Arizona, 2002 – 2006

	2002	2004	2006
Ever used alcohol	80.80	77.90	74.50
Never used alcohol*	19.20	22.10	25.50

*The percent of high school seniors who report never having used alcohol is simply the inverse of the percentage of those reporting that they have ever used alcohol.

Source: *Arizona Youth Survey: State Report, 2002; 2004; 2006*. Arizona Criminal Justice Commission.

Figure 4.18. Trends in Percentage of High School Seniors Reporting Lifetime Alcohol Use by Grade, Arizona, 2002 – 2006.



*The percent of high school seniors who report never having used alcohol is simply the inverse of the percentage of those reporting that they have ever used alcohol.

Source: *Arizona Youth Survey: State Report, 2002; 2004; 2006*. Arizona Criminal Justice Commission.

Table 4.34. Trends in Percentages of Individuals Reporting Past-Month Alcohol Use, Arizona, 2003 – 2005

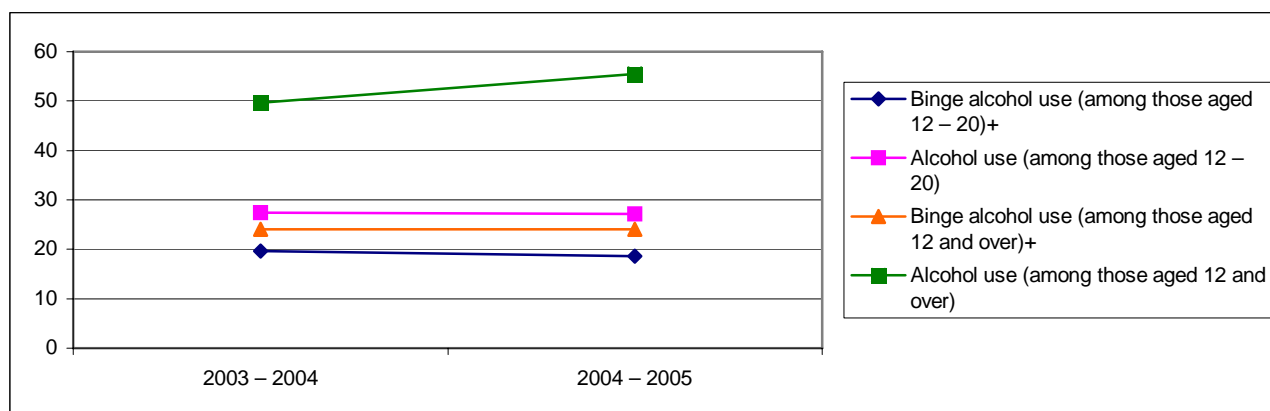
	2003 – 2004	2004 – 2005
Binge alcohol use ⁺ *	19.64	18.59
Alcohol use [*]	27.46	27.15
Binge alcohol use ^{**}	24.10	24.11
Alcohol use ^{**}	49.70	55.43

⁺ Binge alcohol use is defined as consuming 5 or more alcoholic drinks on the same occasion on at least 1 day within the last 30 days.

^{*} among those aged 12 – 20

^{**} among those aged 12 and older

Source: *State Estimates of Substance Use from the 2003 – 2004 and 2004 – 2005 National Surveys on Drug Use and Health*. Substance Abuse and Mental Health Services Administration, Department of Health and Human Services.

Figure 4.19. Trends in Percentages of Individuals Reporting Past-Month Alcohol Use, Arizona, 2003 – 2005.

⁺ Binge alcohol use is defined as consuming 5 or more alcoholic drinks on the same occasion on at least 1 day within the last 30 days.

Source: *State Estimates of Substance Use from the 2003 – 2004 and 2004 – 2005 National Surveys on Drug Use and Health*. Substance Abuse and Mental Health Services Administration, Department of Health and Human Services.

Table 4.35. Trends in Past Month Adult* Alcohol Consumption, Percentages, Arizona, 2002 – 2005

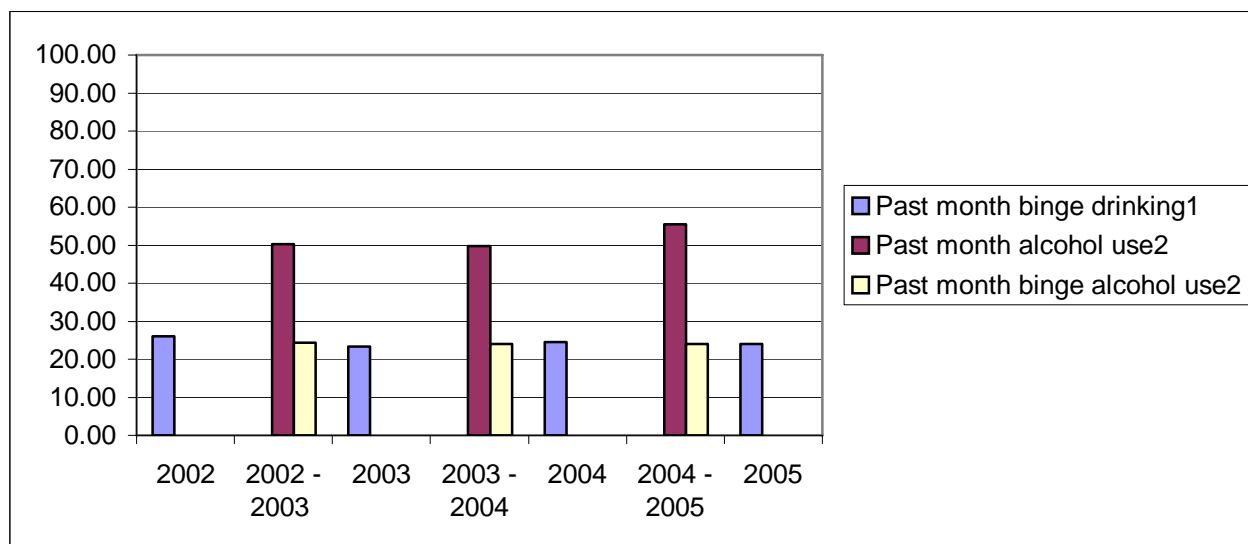
	2002	2002- 2003	2003	2003- 2004	2004	2004- 2005	2005
Binge drinking ¹	26.00	--	23.40	--	24.60	--	24.10
Alcohol use ²	--	50.20	--	49.74	--	55.43	--
Binge alcohol use ²	--	24.32	--	24.08	--	24.11	--

-- indicates data that were not available for this report or were not collected in that year.

* Aged 12 and older.

¹ *National Survey on Drug Use and Health, 2002 – 2005*, Substance Abuse Mental Health Services Administration, Department of Health and Human Services.

² *State Estimates of Substance Use from the 2003 – 2004 and 2004 – 2005 National Surveys on Drug Use and Health*. Substance Abuse and Mental Health Services Administration, Department of Health and Human Services.

Figure 4.20. Trends in Adult* Alcohol Consumption, Percentages, Arizona, 2002 – 2005.

* Aged 12 and older.

¹ *National Survey on Drug Use and Health, 2002 – 2005*, Substance Abuse Mental Health Services Administration, Department of Health and Human Services.

² *State Estimates of Substance Use from the 2003 – 2004 and 2004 – 2005 National Surveys on Drug Use and Health*. Substance Abuse and Mental Health Services Administration, Department of Health and Human Services.

Trends in Tobacco Consumption.

Overall, the percentages of youth in 8th, 10th and 12th grade who reported tobacco use declined over the period of observation (2002 – 2006). However, a few exceptions to this rule should be noted. Specifically, there was an increase in the percentage of 8th grade students who reported past 30-day cigarette smoking and a higher percentage of 8th and 10th grade students reported lifetime smokeless tobacco use in 2006 than did so in 2002. Both state and federal estimates indicate stability in the percentage of adults who report current tobacco use.

Table 4.36. Trends in Percentages of Arizona Youth Reporting Tobacco Use, 2000 – 2005

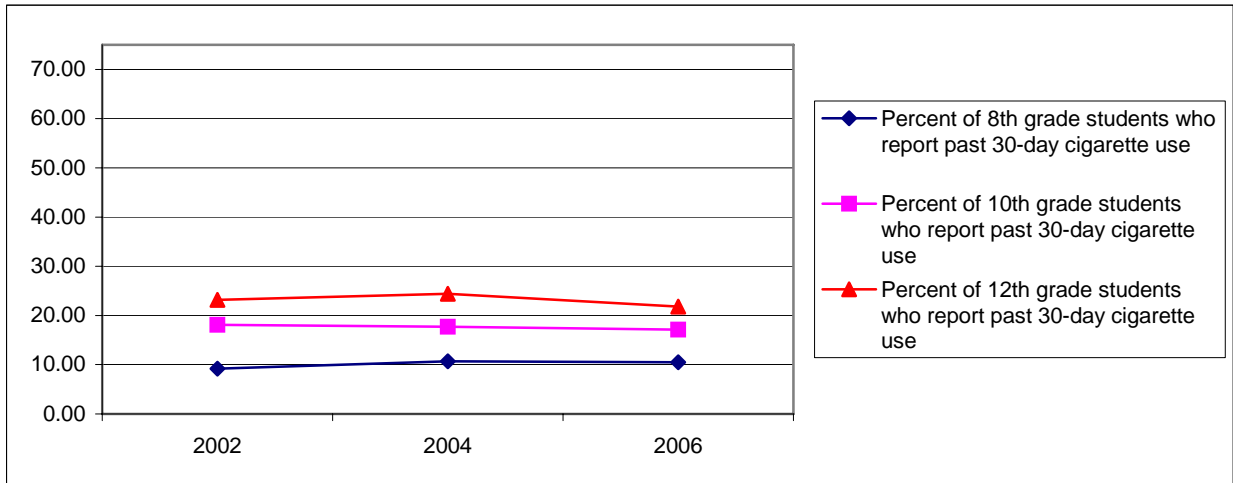
	2002	2003	2004	2005	2006
Current Use¹					
Middle school students who report current cigarette use	--	9.00	--	8.00	--
Middle school students who report current smokeless tobacco use	--	2.00	--	2.00	--
High school students who report current cigarette use	--	19.00	--	20.00	--
High school students who report current smokeless tobacco use	--	5.00	--	4.00	--
Past 30-day Use²					
8 th grade students who report past 30-day cigarette use	9.20	--	10.70	--	10.50
8 th grade students who report past 30-day smokeless tobacco use	4.00	--	2.40	--	2.70
10 th grade students who report past 30-day cigarette use	18.10	--	17.70	--	17.10
10 th grade students who report past 30-day smokeless tobacco use	4.70	--	3.40	--	4.00
12 th grade students who report past 30-day cigarette use	23.20	--	24.40	--	21.80
12 th grade students who report past 30-day smokeless tobacco use	5.90	--	5.40	--	5.40
Lifetime Use²					
8 th grade students who report lifetime cigarette use	39.60	--	33.50	--	30.80
8 th grade students who report lifetime smokeless tobacco use	6.80	--	7.20	--	8.00
10 th grade students who report lifetime cigarette use	49.80	--	45.30	--	43.80
10 th grade students who report lifetime smokeless tobacco use	10.20	--	11.00	--	11.80
12 th grade students who report lifetime cigarette use	61.10	--	54.20	--	50.00
12 th grade students who report lifetime smokeless tobacco use	16.90	--	16.70	--	15.60

-- indicates data that were not available for this report or were not collected in that year.

¹ Arizona Youth Tobacco Survey 2005 Report. Arizona Department of Health Services.

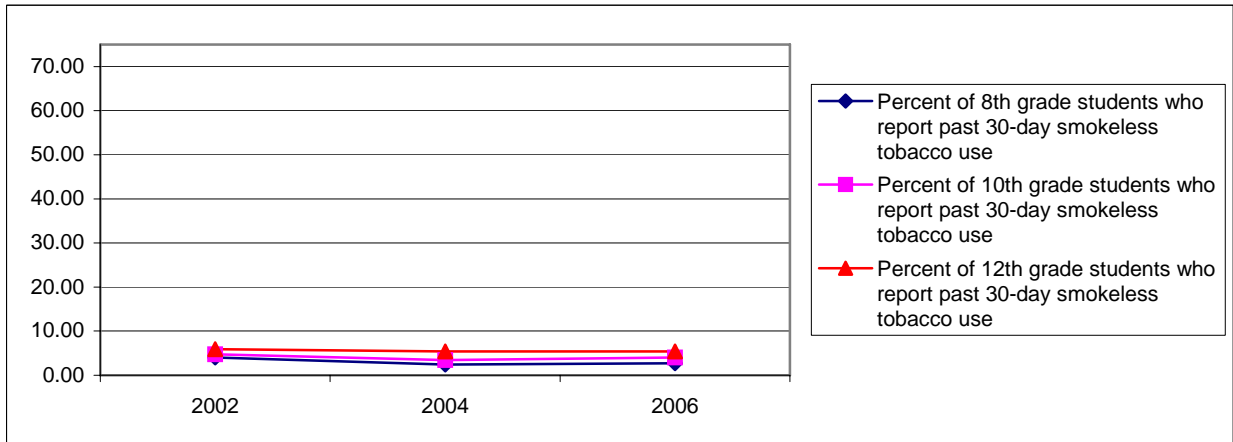
² Arizona Youth Survey, State Report, 2006. Arizona Criminal Justice Commission.

Figure 4.21. Trends in Percentage of Students Reporting Past 30-Day Cigarette Use, 2000 – 2006.



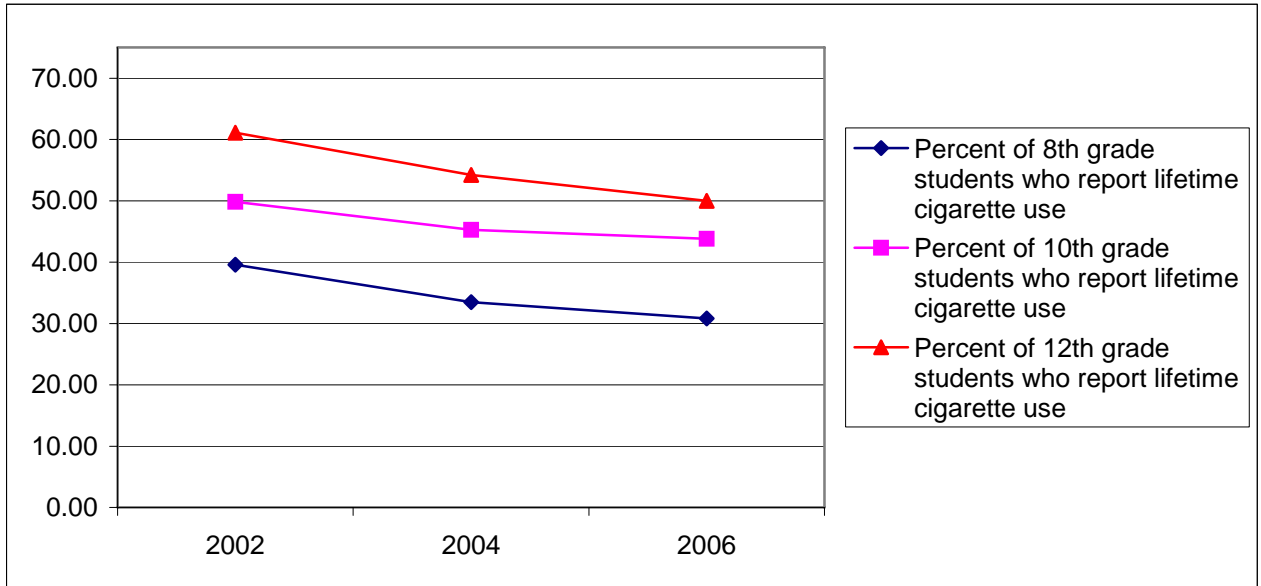
Source: *Arizona Youth Survey, State Report, 2006*. Arizona Criminal Justice Commission.

Figure 4.22. Trends in Percentage of Students Reporting Past 30-Day Smokeless Tobacco Use, 2000 – 2006.



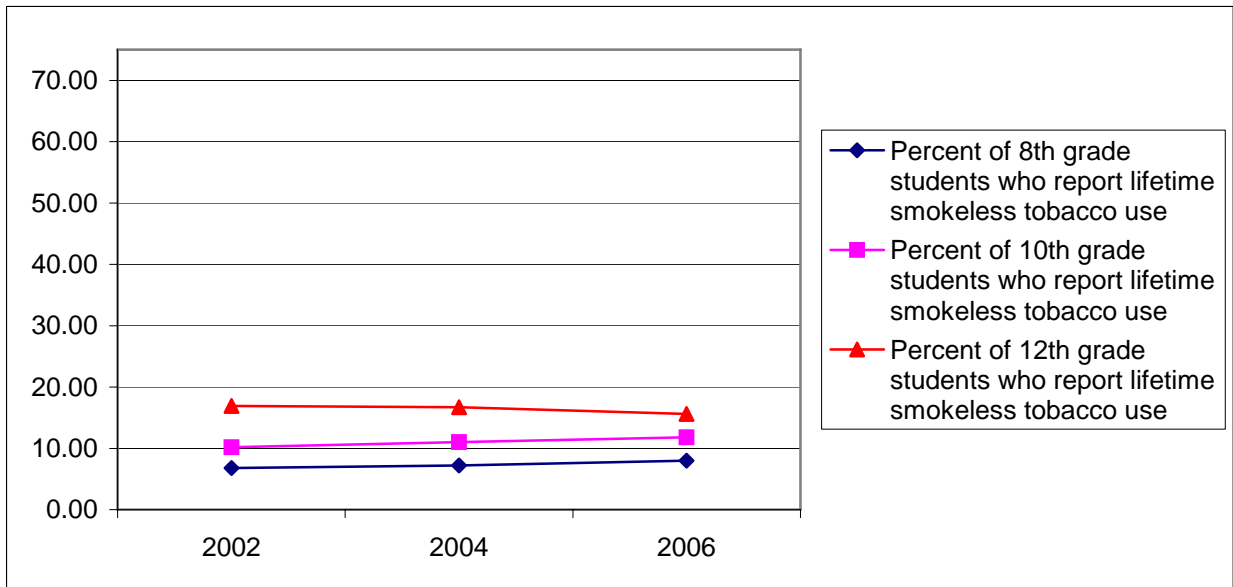
Source: *Arizona Youth Survey, State Report, 2006*. Arizona Criminal Justice Commission.

Figure 4.23. Trends in Percentage of Students Reporting Lifetime Cigarette Use, 2000 – 2006.



Source: *Arizona Youth Survey, State Report, 2006*. Arizona Criminal Justice Commission.

Figure 4.24. Trends in Percentage of Students Reporting Lifetime Smokeless Tobacco Use, 2000 – 2006.



Source: *Arizona Youth Survey, State Report, 2006*. Arizona Criminal Justice Commission.

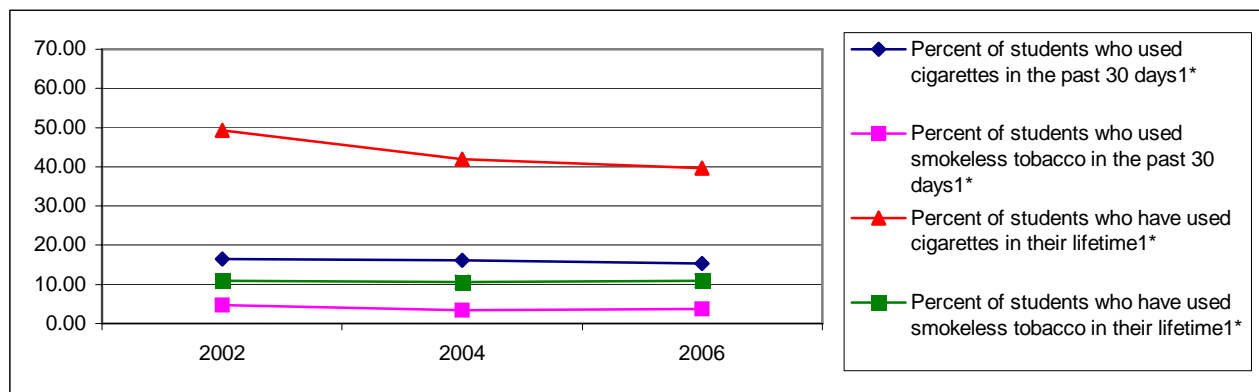
Table 4.37. Trends in Percentage of Youth Reporting Tobacco Consumption, Arizona, 2002 – 2006

	2002	2004	2006
Cigarettes in the past 30 days	16.50	16.10	15.30
Smokeless tobacco in the past 30 days	4.80	3.40	3.80
Cigarettes in lifetime	49.30	42.00	39.60
Smokeless tobacco in their lifetime	10.90	10.60	11.00

Note. 8th, 10th and 12th grade students combined.

Source: *Arizona Youth Survey: State Report, 2006*. Arizona Criminal Justice Commission.

Figure 4.25. Trends in Percentage of Youth Reporting Tobacco Consumption, Arizona, 2002 – 2006.



Note. 8th, 10th and 12th grade students combined.

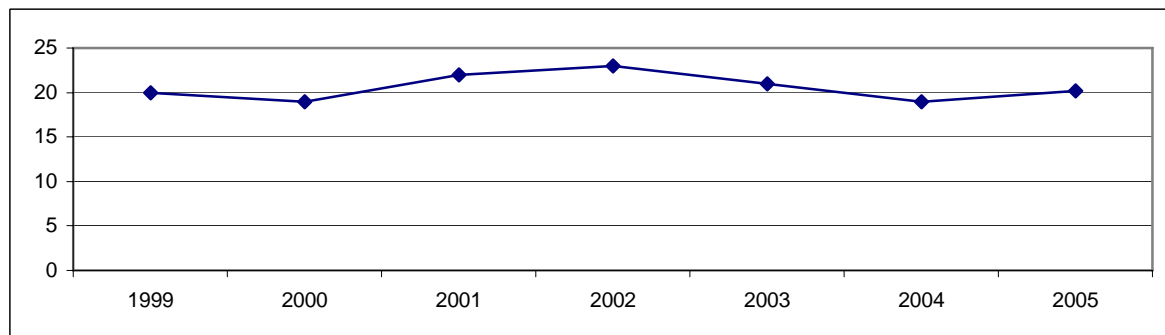
Source: *Arizona Youth Survey: State Report, 2006*. Arizona Criminal Justice Commission.

Table 4.38. Trends in Percentage of Adults Reporting Current Cigarette Smoking, Arizona, 1999 – 2005

	1999	2000	2001	2002	2003	2004	2005
	20.00	19.00	22.00	23.00	21.00	19.00	20.20

Source: *2005 Behavioral Risk Factors of Arizona Adults*. Arizona Department of Health Services.

Figure 4.26. Trends in Percentage of Adults Reporting Current Cigarette Smoking, Arizona, 1999 – 2005.



Source: *2005 Behavioral Risk Factors of Arizona Adults*. Arizona Department of Health Services.

Trends in Illicit Drug Consumption.

While the data reveal a general downward trend in lifetime illicit drug consumption, the use of inhalants is the exception to the rule. An increase of two percentage points is seen in students who reported the use of inhalants between 2002 and 2006. However, a remarkable reduction is noted in the percentage of youth who reported the use of Ecstasy during their lifetime. The percentage of youth who reported such use in 2004 was less than half that of the youth who reported using Ecstasy in their lifetime in 2002 and the percentage of youth who reported Ecstasy use continued to drop between 2004 and 2006. While trends in the misuse of prescription drugs (i.e., use without being told to do so by a physician) cannot be determined because of the recent measurement of this type of substance use, it is important to note that almost 15% of youth reported such use in 2006.

Finding: A 25% decrease in youth who reported marijuana use during their lifetime was noted between 2002 and 2006.

Table 4.39. Trends in Percentage of School Youth Reporting Illicit Drug Consumption During their Lifetime, Arizona, 2002 – 2006*

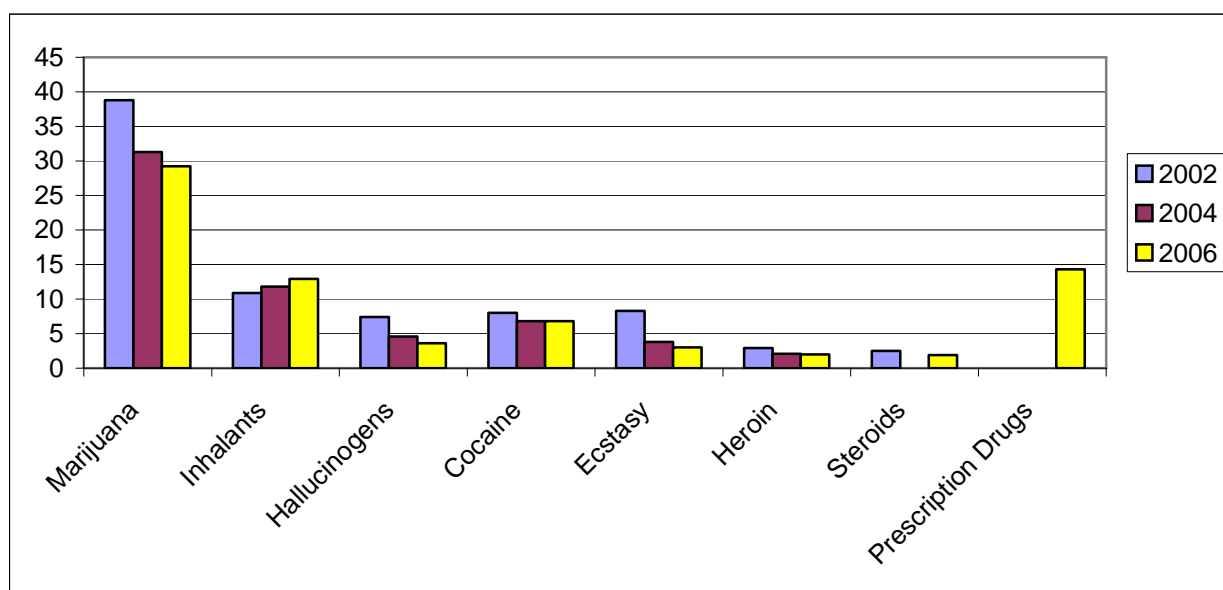
	2002	2004	2006
Marijuana	38.80	31.30	29.20
Inhalants	10.90	11.80	12.90
Hallucinogens	7.40	4.60	3.60
Cocaine	8.00	6.80	6.80
Ecstasy	8.30	3.80	3.00
Heroin	2.90	2.10	2.00
Steroids	2.50	--	1.90
Prescription Drugs	--	--	14.30

-- indicates a question that was not asked in the survey for that year.

* 8th, 10th and 12th grade students combined.

Source: *Arizona Youth Survey: State Report, 2006*. Arizona Criminal Justice Commission.

Figure 4.27. Trends in Percentage of School Youth Reporting Illicit Drug Consumption During their Lifetime, Arizona, 2002 – 2006.*



* 8th, 10th and 12th grade students combined.

Source: *Arizona Youth Survey: State Report, 2006*. Arizona Criminal Justice Commission.

Table 4.40. Trends in Percentage of Respondents Reporting Illicit Drug Consumption, Arizona, 2002 – 2005*

	2002 – 2003	2003 – 2004	2004 – 2005
Past month any illicit drug use	8.90	8.30	7.30
Past month marijuana use	5.70	5.90	5.30

* Among persons aged 12 and over.

Source: *State Estimates of Substance Use from the 2002 – 2003, 2003 – 2004 and 2004 – 2005 National Surveys on Drug Use and Health*. Substance Abuse and Mental Health Services Administration, Department of Health and Human Services.

Trends in Methamphetamine Consumption.

An overall reduction in the percentage of youth who reported past 30-day methamphetamine use is noted, except among 8th grade students where no change is seen. However, a lower percentage of 8th grade students reported the use of methamphetamine than did those in 10th and 12th grades. Further, in 2006, a lower percentage of students in all grades reported lifetime methamphetamine use than did so in 2002.

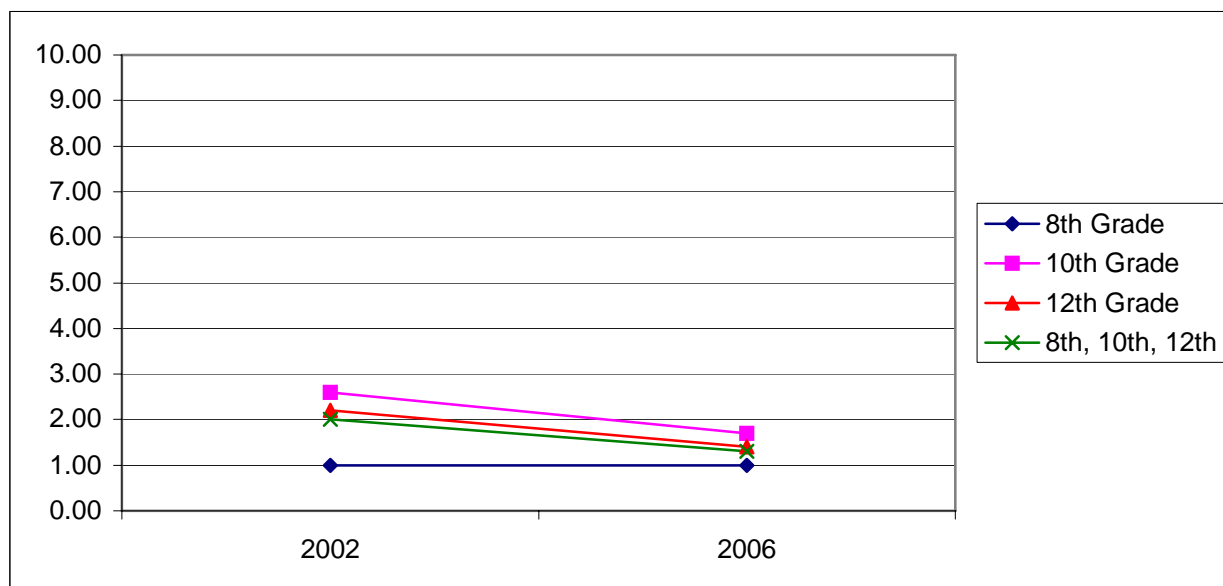
Table 4.41. Trends in Percentages of Youth Reporting Past 30-Day Methamphetamine Use, 2002 – 2006

	2002	2004	2006
8 th Grade Students	1.00	1.60	1.00
10 th Grade Students	2.60	2.80	1.70
12 th Grade Students	2.20	3.00	1.40
8 th , 10 th & 12 th Grade Students Combined	2.00	2.30	1.30

Note. In 2002, the methamphetamine use category included methamphetamines, crystal, and crank. In 2004, the Stimulant use category included amphetamines, methamphetamines, crystal, and crank (i.e., there was not a separate methamphetamine use category). In 2006, the methamphetamine use category included methamphetamines, speed, crank, and crystal meth. Therefore, only changes in the percentage of youth who reported methamphetamine use that occurred between 2002 and 2006 should be examined.

Source: *Arizona Youth Survey: State Report, 2006*. Arizona Criminal Justice Commission.

Figure 4.27. Trends in Percentages of Youth Reporting Past 30-Day Methamphetamine Use, 2002 – 2006.



Note. In 2004, methamphetamine use was included in the broader Stimulant category, which included amphetamine, methamphetamine, crystal, and crank. For this reason, only changed from 2002 to 2006 should be examined.

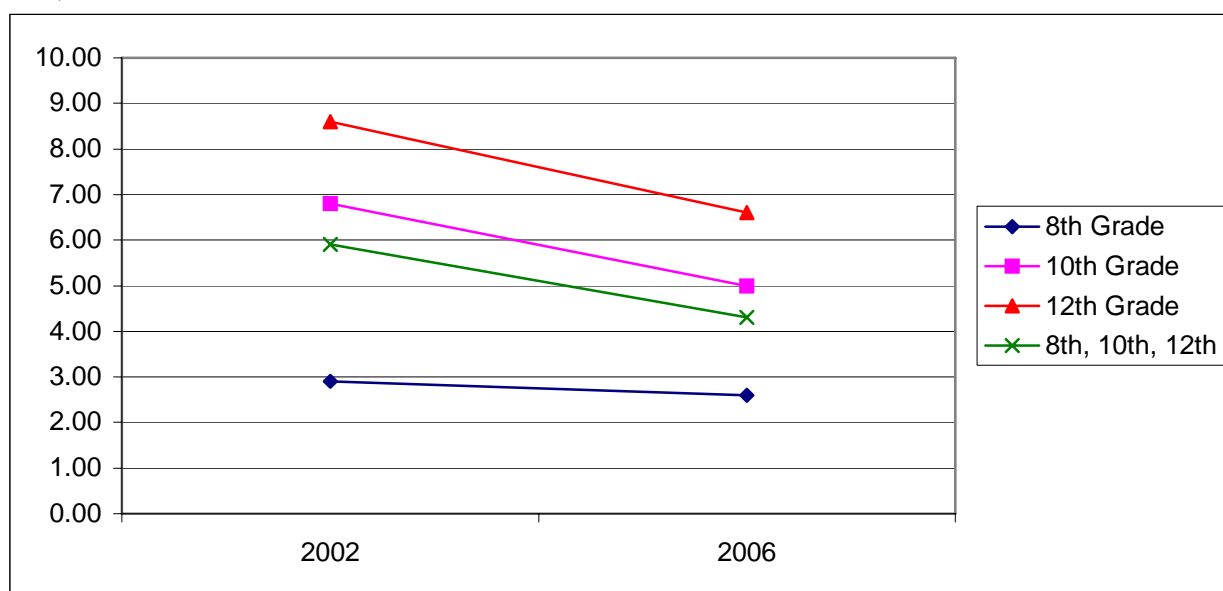
Source: *Arizona Youth Survey: State Report, 2006*. Arizona Criminal Justice Commission.

Table 4.42. Trends in Percentages of Youth Reporting Lifetime Methamphetamine Use, 2002 – 2006

	2002	2004	2006
8th Grade Students	2.90	3.40	2.60
10th Grade Students	6.80	6.70	5.00
12th Grade Students	8.60	8.20	6.60
8th, 10th & 12th Grade Students Combined	5.90	5.50	4.30

Note. In 2004, methamphetamine use was included in the broader Stimulant category, which included amphetamine, methamphetamine, crystal, and crank. For this reason, only changes from 2002 to 2006 should be examined.

Source: *Arizona Youth Survey: State Report, 2006*. Arizona Criminal Justice Commission.

Figure 4.28. Trends in Percentages of Youth Reporting Lifetime Methamphetamine Use, 2002 – 2006.

Note. In 2004, methamphetamine use was included in the broader Stimulant category, which included amphetamine, methamphetamine, crystal, and crank. For this reason, only changes from 2002 to 2006 should be examined.

Source: *Arizona Youth Survey: State Report, 2006*. Arizona Criminal Justice Commission.

Table 4.43. Trends in Percentages of High School Students Reporting Lifetime Methamphetamine Use, 2003 – 2005.

	2003	2005
	10.60	8.80

Source: *Youth Risk Behavior Surveillance System*, Centers for Disease Control and Prevention.

Consumption-Patterns Summary: Youth experimentation appears to begin with cigarettes. The same percentage of youth who reported current cigarette use also reported current marijuana consumption. The percentage of youth who reported smoking marijuana declined 25% between 2002 and 2006.

In addition to examining illicit drug and tobacco consumption, the study of alcohol use is vital to the understanding of health consequences, as some consumption patterns, such as binge drinking, provide crucial predictive information. In fact, we find that alcohol continues to be the most frequently used substance for adults and youth in Arizona, placing a large burden on the state.